nia should not be understood as an expression and consequence of fear. It seems to me that neurasthenics are all suffering from an inordinately exaggerated fear of some kind. In some cases it is simply the idea of a threatened loss of sexual power from some trifling ailment in the genito-urinary organs; in others a slight digestive disorder that fills them with the apprehension of some malignant growth in the stomach or intestines. A sorrow, or fear of great financial loss and distress from a lawsuit, attended perhaps by painful publicity, may in itself without any anatomical or func-tional lesion cause neurasthenic symptoms from any group of organs, loss of appetite, weight, etc.
The effect of fear on the vasomotor centers is well known as a matter of daily experience, and it is to this chronic paralyzing effect we have to look as a great contributor, if not creator, of the complex called neurasthenia. The removal of that fear is the solution of the problem. There Christian Science celebrates her sham triumphs by giving the faithful hope and the belief that there is no real sickness and no real misfortune. If there exists an organic basis for the symptoms the physician has to remedy that, in order to remove the aggravating fear. So, whether with purely psychic treatment in ferreting out the primary reasons for a complex of harassing phantoms, or after diagnosing the primary pathological causes for the superstructure of fear, we have to get at them and remove them if we want to cure our neurasthenic patients. Let me close my remarks with a slight historical correction. Dr. McClenahan mentioned in his paper that physiological psychology is a matter of the last fifteen or twenty years. Professor Wundt, now in Leipzic, published the first edition of his Lectures on Physiological Psychology in 1869. It was the fundamental classic for this branch of our science and should not be forgotten branch of our science and should not be forgotten.

Dr. McClenahan, closing: The position which I tried to portray in my paper is that psychotherapeutic measures are indicated in exactly the same way as are other therapeutic agents to the conditions that unfavorably affect the human being. Whether the symptoms are mental, physical or even moral or spiritual, if you please, the physician's duty and his only duty, is to search for the causative factor. If the causative factor is not strictly confined to the organism or its nervous system, but has its origin in the mental life of the individual, our position should not be altered.

We must deny the role of pathogenic ideas in the causation of a number of maladies before we can deny the clean-cut, scientific indications for mental treatment. Before the application of any treatment, the physician must determine the causal factor, and if this factor lies in the mental life or experience of the patient, he should not be denied the proper corrective measures, though they be psychic. The physician's view of the individual must be dualistic, i. e., that he has a mental and physical existence, and that disturbances have their origin in abnormal functional processes as well as in structural changes. If the disturbance has its origin in structural changes, the nature and extent of these changes is to be determined; if there is no structural alteration and the disorder is due to abnormal physiological processes, treatment is directed accordingly, regardless of whether the symptoms are physical or mental. There is no psychology that concerns the physician except that based upon the physiology of the brain; and unless he is acquainted with the physiology of that organ, he is no more fitted to treat its disorders than the in-ternist who is ignorant of the functions of the liver. To give an individual with as clean-cut psychogenic disorder as this case whose history I have given to-night, such remedies as bromides, or even hypodermics of soda cacodylate, appears ridiculous, and yet in the absence of the facts brought out by minute inquiry into the entire mental experience,

such measures would likely have been instituted. In making that inquiry, time must not count. In this case hours and hours were consumed on various days in questioning his wife, brother and himself. To get that information practically entailed a complete history of the mental life of the individual up to the beginning of his disorder. The diagnosis of hypochondria could have much more easily been made. This condition is regarded as a fixed idea or delusion of disease, and the prognosis hopeless. Had such a diagnosis been made, and the man sent to a state hospital, there is little question but that he would to-day be sitting on a bench holding his jaw in his hand. If there was any rational way to cure this man except by convincing him of the ideogenic origin of his disorder, I confess my inability to see it.

PSYCHIATRIC DUTIES OF LARGE CITIES.*

By ROBERT L. RICHARDS, M. D., Medical Supt., Mendocino State Hospital.

To the community at large the important point about the insane is that they are unsocial or anti-The directing or dominating part of an individual is found in his mental faculties; when these are disturbed, his relations to others are disturbed, and he becomes unsocial or antisocial. The lack of community of interests and thoughts is one of the striking features of a hospital for the insane. The environment of these patients is parallel with that of soldiers in barracks, for example; and yet the reaction of the insane under these circumstances is radically different. Unless convalescent they rarely talk to one another, and usually on parole or in the wards each is thinking or talking about his own personal affairs, and paying no attention to anyone else. On this account, and contrary to the usual conception, a state hospital is quieter in general than an institution housing an equal number of sane people. By training and re-education is secured an adaptation to a routine way of living, and a gradual resumption of social duties. The finer adjustments of social life are the latest acquisition of the human race, and naturally the point where mental derangements are first noticed, and where recovery is last established. Hence our chief interest is in the social manifestations of the insane.

The value of heredity as a determining factor in the life of the individual has recently attracted a great deal of attention; and, indeed, its value cannot be overestimated. But whatever may be the cause, the practical question with the community at large is the social question. The fact that man acts upon and reacts to his environment is the one that concerns us in our conduct and our laws regulating such conditions. The law says that the individual must be "dangerous to health, person or Chronic insane, imbeciles, idiots, or property." epileptics who are adaptable to the social mechanism are not considered cases for commitment. It it evident, therefore, that the psychiatric duties of a community are well-defined and extensive because of the predominantly social relations of cases of mental disease.

The importance and urgency of social duties in-

^{*} Read before the San Francisco County Medical Society, March 11, 1913.

crease with the density of population. People in rural districts come in contact with each other at fewer points and at less frequent intervals. In large cities there is scarcely a moment of the twenty-four hours when the individual is not in contact with some other individual. Since psychiatric duties are chiefly social duties, we can readily see that large cities have more psychiatric duties than other portions of the country.

When in our state hospitals we study the relative proportions of mental diseases from large cities and rural districts, we find striking evidence of the great responsibility of large cities for the mentally diseased. In 1908 in New York State the cities furnished 76.5% of the first admissions, and villages and rural districts only 23.5%. In California in the last two biennial periods the percentage of admissions from the larger cities has been 63.5% and 64.7%. If we include the more thickly populated counties, the percentage reaches 73% and 74.7%. It is noticeable in these figures that San Francisco and the Bay section are represented with 33% and 34.7% of all the admissions to state hospitals in the last two biennial periods. When you take into consideration the fact that with the opening of the Panama Canal San Francisco will in all probability speedily double in population, you can readily see that San Francisco's psychiatric duties will also double in amount.

In the last biennial period Mendocino State Hospital received 76% of all its admissions from the San Francisco section, while Napa received 53%, Agnews 49%, and Stockton 34% from the same locality. Consequently Mendocino State Hospital is more interested in and more reflective of San Francisco conditions than any of the other hospitals.

Another fact for consideration (in view of the large number of immigrants soon expected in San Francisco), is the relative proportion of foreign born among those admitted to state hospitals. At relatively the same period (1908) New York state had 48.3% foreign born among those admitted to state hospitals, and California 40.5%. Since Mendocino State Hospital represents more nearly conditions in San Francisco, it is interesting to note that in the last two biennial periods Mendocino State Hospital received 43.9% and 48% foreign born patients. Hence we believe that it is safe to say that from the standpoint of the expected rapid increase of foreign born in San Francisco the psychiatric duties will increase more rapidly than might be expected; and that San Francisco is more interested in this fact than any other portion of the state.

Having realized the special relationship of our large cities to the psychiatric work of the state, it is very encouraging also to realize that our larger cities are better able to fulfill these psychiatric duties. Large cities have richer and more highly developed governmental organizations, many organizations engaged in various forms of social work, and probably more people of means who would furnish financial assistance to meritorious projects. Hence we are fortunate in having at

the point of greatest psychiatric need the most effective means to meet that need.

The problem is largely to co-ordinate the various interests involved so that they will work in harmony, and not duplicate work, or come in conflict. The first essential to this end is some central directing point. Particularly in mental cases, with all their conflicting manifestations, is it necessary to be guided by those with special experience. It seems perfectly natural that this center should be a psychiatric hospital or wards, where the more serious cases could be cared for, the less serious be properly treated, and the work generally directed. I understand that there is now the possibility of utilizing two wards in the new San Francisco General Hospital as psychiatric wards. This is the method that has proven so helpful at Bellevue Hospital, in New York City. Probably, also, we should find here as they have found there that two wards offer insufficient accommodation for the work in hand. At Bellevue the chief alienist, with two assistant alienists, are in charge of the work, including the psychiatric division of the social service work.

In general, you can readily see that the work would divide itself under the following headings:

1st. Early treatment; which would mean for the milder cases recovery without commitment, and the shortening of the duration of the more severe cases. At present, with the short period of observation, it is inevitable that some cases are sent to state hospitals that would have recovered without commitment, with longer observation and treatment in such a hospital as this.

2nd. Out-Patient department; where preventive measures could be carried into effect, and aftercare and treatment provided for cases discharged from state hospitals, but not yet adapted to their social environment.

3rd. A medical center: of value especially to those needing a closer acquaintance with the various manifestations of mental disease. Laboratory facilities of various sorts would be available or would develop. Senior medical students could come in contact with actual cases, under circumstances that would make it possible for them to study them and their manifestations profitably. Assistant medical officers in the state hospitals could be assigned here for limited periods to study the earlier manifestations of mental diseases, and acquaint themselves with the more advanced laboratory and clinical methods. The state needs some such center as this, and could afford to assist in the work because of the various benefits to accrue to the state service from this work.

The question of the method of admission of patients to a hospital of this sort has always been a difficult one. On the one hand, there is the evident need of as free admission to a hospital for mental diseases as to a hospital for physical diseases. On the other hand, mental diseases carry with them certain questions of legal responsibility that must be adjusted by a court. To accomplish the first purpose, voluntary admissions may be provided for such cases as are orderly, and willing to enter the hospital for treatment. The number of such cases

will increase as the work is better understood. Naturally, however, they cannot be retained against their wishes. The cases legally admitted can, of course, be retained by the hospital authorities, subject to the jurisdiction of the legal authority acting in the case. In California the law at present makes possible the detention of persons under lunacy warrant of arrest for a maximum period of twenty days. I understand this period may be extended by changes contemplated by the present legislature. A longer period for observation and treatment of the cases gives better results, and is ultimately more economical. In Germany the period is forty-two days. It is the universal experience that jails, courts, police, and unskilled attendants are very damaging to acute mental cases that are already alarmed by terrifying hallucinations or are full of persecutory ideas. This experience has led New York to adopt various methods of admitting mental cases to Psychiatric and State Hospitals. In New York City, when a mental case (to quote the law) "acts in a manner that would be disorderly in a sane person," the police may enter a technical charge of insanity against him, and place him in the Psychiatric Pavilion at Bellevue for observation and treatment. In addition, those interested are endeavoring to have hospital nurses deputized as special police officers, so that they may accompany the ambulance to the home and take charge of the case. Mental cases that are not disorderly (paranoid condition, for example), must appear before a city magistrate, who will determine whether they shall be committed for a period of five days for examination. City magistrates may also commit to Bellevue for an examination of their mental condition cases against whom charges are pending. Besides these methods and the regular commitment, there is in New York State Hospital an emergency commitment to state hospitals. The law is that "In a case where the condition of said person is such that it would be for his benefit to receive immediate care and treatment, or if he is dangerously insane, -so as to render it necessary for public safety that he be immediately confined,—he shall be forthwith received by a state institution . . . upon a certificate of lunacy executed by two medical examiners, and the petitioner to apply to a court for an order of commitment." These New York methods have stood the test of a number of years' experience, and merit our careful consideration as to adoption in California.

The discharge of mental cases from a psychiatric hospital depends upon the method of admission. Voluntary cases can be discharged to their friends or after-care societies, or to the court for commitment. Legal cases must necessarily be discharged with or to the authority committing them; but this does not mean necessarily that they are sent to the jail. The study of the case in the psychiatric hospital should make it so clear that only a nominal appearance in court would be necessary. Legal cases, while in the psychiatric hospital, are naturally available for the study of the local lunacy examiners, who will be aided in reaching a conclusion by the hospital study and observation.

I am informed in a personal letter that at present 75% of the admissions to the Psychiatric Pavilion at Bellevue are committed to state hospitals, and that the average admission rate is 10 cases per day. According to the report for the last biennial period, San Francisco averages 98 commitments per month. I understand that each ward in the San Francisco General Hospital is designed to accommodate 30 patients. Hence the total capacity would not exceed 60, and it is evident that not all of the present commitments from San Francisco could be accommodated for a period long enough to secure any therapeutic re-Fortunately, certain cases are plainly for commitment when received, and can be sent directly to the state hospitals. Reducing thus the number legally admitted to the psychiatric hospital, we should have, with the voluntary cases, a sufficient number awaiting treatment to fill the two proposed wards.

Experience has shown, however, other needs for these psychiatric wards. In Washington, D. C., Juvenile Court cases are sent to the Government Hospital for the Insane for the study of their mental condition, and the measurement of their mental age by the Binet scale. In New York City (as we have seen) courts send prisoners to Bellevue for a study of their mental condition. In some instances courts in San Francisco have empowered a medical commission to investigate, examine, and report upon the mental condition of the prisoner, with the result (in each case in which I have been a member of the commission) that they unanimously and promptly agreed in their findings. Such a procedure would be adopted more frequently if there were a Psychiatric Hospital in San Francisco.

There are two special reasons why psychiatric wards in a general hospital are desirable.

1st. Cases of acute delirium and other acute psychoses that may develop on the other wards are better and more safely managed in the psychiatric service. For example,—Kraepelin found that the danger of suicide was reduced 90% by trained attendants and institutions.

2nd. It is the general experience that nurses who have had experience with mental cases adapt themselves with less friction to the mental attitude of other patients.

You will no doubt agree with me that, because of the predominating social aspect of mental cases, social service work is even more needed for psychiatric wards than for the general hospital service. The social service nurse, after consulting (under the direction of the physician) with the patient on the ward, will be a welcome visitor to the house, and be able more intelligently to study and report upon the social condition in which the patient has been living. As needed, it has been found possible to secure the aid of volunteers for social work. Various benevolent organizations can be interested in securing the necessary changes and after-care for the discharged patient. Social service work with nervous and mental cases has been found also to include the securing of change of employment and environment for neurasthenics, counsel and aftercare for alcoholic and drug habitues, friendly aid for attempted suicides, and the accompanying to court of prisoners. This is all work the physicians cannot have time to do, but without which all of his study and treatment may be of no avail.

Besides the establishing of a psychiatric hospital with its various activities as a natural center for psychiatric work, a city's duties should include specific efforts to prevent mental disease, and to furnish after-care for those mental cases discharged from our various state hospitals, but not yet established in the social body. These two purposes are combined in the work of the National Society for Mental Hygiene. It has proven very successful where it is properly co-ordinated with the other phases of psychiatric work. Not properly co-ordinated, it has all the defects of the kind-hearted, well-meaning individual who wants to do the right thing, but does not know where or how. So far there is no branch of this society in Northern California; but there is a widespread public interest that needs only opportunity to become very active. Let me make clear its object by briefly mentioning the details of work along these two lines.

The prevention of mental disease is not expressed in bacteria and antiseptic solutions, but in questions of social relations, of social evils, and the remedies necessary. In summing up the etiology of mental diseases, Kraepelin says: "By far the most important causes of mental disease are represented on the one hand by alcohol (23%) and syphilis (10%) in their effects on the individual and his offspring, and on the other hand by direct heredity (30%). . . It must be the holy duty of physicians to so increase the pressure of public opinion that the fight against alcohol and syphilis will be taken up with the same insistence and demand for relief as is the case with tubercu-In New York, of all the first admissions for one year, the alcoholic psychoses and general paresis formed 27.5% in the cities, and only 14.2% in rural communities. General paresis alone was nine times more common in the cities than in rural communities. The element of heredity is; unfortunately, not comparable in this fashion; but evidently this is especially a problem for cities. fight against alcohol and syphilis is an old one; but the public knows only a small part of the dangers of alcohol and syphilis from the standpoint of the nervous system. Along the lines in which tuberculosis has been quite successfully fought, we have made only feeble attempts to attack alcohol and syphilis; and the voice of the medical profession is heard only here and there. We have need of a Society for Mental Hygiene to bring this subject to the front.

The importance of heredity is co-ordinate with that of both alcohol and syphilis. The general principles have been well understood for many years. We have just passed through a cycle of forgetfulness, however, and now the subject is so prominent that I need not urge upon you its importance or its laws. The intensive advanced work already planned will not permit us to soon again forget the value of heredity.

A fourth point, however, needs great emphasis,-

the necessity for medical guidance at the epochal points of mental development. The sound body is always necessary for the perfect development of the sound mind; but there are certain times and phases when there is special need of medical guidance. In the plastic phase of the infant's mind, general mental tendencies are easily implanted. seen anger at two months, and habits of life established in early months of life. When the education of the child begins, certain fundamental principles are often forgotten. Progress should rather be marked by the development of effective action than by memory acquisitions. Again, experiment has clearly shown the tiring of adults after one hour of mental exertion. A continued tiredness after a night of rest is pathological. But today there is demanded more and more continuous work from pupils in the public schools, and the voice of the medical profession is not heard. Were it not for the protective action of the loss of the power of attention, the result among these children would be more serious. Again, all children are not equally capable of development. Medical knowledge should classify them, and not over-stimulate the one or retard the other. One of the signs of hereditary taint is early tiring, and it is vastly important that those beginning life with an hereditary defect should be given a path in life where their ability will not be overtaxed, but where their maximum efficiency will be attained.

At puberty come the sex problems, and those of alcohol and syphilis, with the importance of which we are all familiar. With the passing of family guidance in adult life there are many ways that will suggest themselves in which society can help over the period of temporary stress and strain, and save a defective individual from failure. Psychiatrists have observed that the mental force of men differs greatly,-partly from hereditary influences and partly from accidental happenings at birth or in early life. Some individuals are bound to fail; but a large number would round out a fairly useful life if they received timely and intelligent aid. Lacking that aid, they often become chronically insane, and are never again self-supporting. It is all along these lines of preventing mental breakdown that the National Society for Mental Hygiene finds a wide field of influence.

In the readjustment of the recovered mental case to his social surroundings there is another field of endeavor for this national movement,—which is generally called "after-care." Having done all we can to prevent mental disease, or to lessen its severity if already developed, there remains the duty of maintaining recovery by every means in our power. That relapses are common is all the more reason for aiding those for whom too often the public increases the burden, rather than lessens it. Even discharged alcoholics tell me they have difficulty in securing employment, if it is known that they have been committed for treatment under, the state law.

While this work is considered as new, its history dates back to 1841, when Dr. Falret established in Paris an after-care association and a convalescent home. In 1871 the same movement be-

gan in England, along the same lines. But it was not until 1886 in England and 1889 in France that the work spread to any extent. Germanspeaking countries have similar organizations to those in France and England. Japan inaugurated the work in 1902 with the establishment of an organization called "The Tokio Ladies' Aid Association for the Insane."

In America, this question was first agitated in 1893, and in 1897 a commission of fifty alienists reported favorably, and an association for aftercare was formed; but no practical work was done. New York began the work practically in 1906. Since then, the work has been extended more widely in Massachusetts, Connecticut, Michigan and Illinois. Convalescent homes have not been popular with us because of the fundamental American feeling of independence; but personal helpfulness has been most effective and successful. Consequently, we have developed a class of skilled so-called "field-workers," who search out the weak points in the environment, the probable hereditary influences, and what social remedies could best be made use of. Naturally, they work in conjunction with the various hospitals, and some of the most valuable work in heredity has been done in this We find that field workers are now maintained in New York, New Jersey, New Hampshire, Massachusetts, Connecticut and Michigan. In Northern California none of this work is as yet established, although some of us have been approached repeatedly on the subject. This work should begin with the local medical society, and be closely associated with the psychiatric hospital and its out-patient department.

I have endeavored to present to you briefly, and I hope clearly, the psychiatric duties of a large city, and the needs of a large class of people whom you all pity, but whom you so far have helped very little, if any. If the medical profession urges and directs it, we know that it is perfectly possible to successfully organize a psychiatric hospital or wards, and a National Society for Mental Hygiene. If the medical profession neglects this opportunity, we shall see still further evidence of the lack of co-operation of the general public with the medical profession and its aims.

Dr. Richards' paper was discussed by Dr. W. F. Snow, who read a letter from Dr. F. W. Hatch, and Drs. D. D. Lustig, C. D. McGettigan, R. L. Wilbur, H. C. Moffitt, H. J. Waterman, P. K. Brown, H. C. McClenahan and R. L. Richards.

ARE WE DOING AS MUCH FOR THE TUBERCULOUS PATIENT AS WE SHOULD?*

By FRANCIS MARION POTTENGER, A. M., M. D., LL. D., Monrovia.

While the subject of my talk before you may be criticized because of its almost limitless scope, yet I shall attempt to treat it concretely and not in the rambling manner that might be suggested by the title. I shall attempt to discuss tuberculosis in the light of the recent advanced studies of its

*Read by invitation before the Minneapolis Medical Society May 20, 1912.

pathology and to bring to your attention the breach which exists between our ability to diagnose the disease early and the diagnosis which is usually made; the curability of the disease established by the best clinical methods and the result usually obtained; and the preventability of the disease as based upon both theory and experience, and the actual prevention which is being carried out.

The more carefully we study the pathology of tuberculosis the more firmly we are convinced that there is a time when practically every case is curable if only the proper means are instituted under the proper conditions. Most of the exceptions to this statement are found in the class of early cases of tuberculosis produced by an exceptionally virulent strain of the bacillus or by the inoculation of enormous numbers of bacilli. Under all other conditions, after the infection occurs, the organism regains a temporary advantage, which, if followed up, could usually be turned to a lasting result.

The more we study the therapeutics of tuberculosis the more are we convinced that both physicians and patients are wasting valuable time at the expense of an enormous amount of effort in striving for a favorable result after tuberculosis has become an advanced clinical condition. To be sure it is worth the effort to him that regains health; but even he could have gained his result earlier and more certainly had he fought the disease in its earlier stages.

If ever we are to make headway in the treatment of tuberculosis it must come through the recognition and understanding of its early pathology. We must emphasize the latent stage of the disease. We have been so thoroughly taught that syphilis may be present without producing symptoms and yet be a dangerous disease, that this knowledge is common property. So must the same fact be impressed upon the medical profession as regards tuberculosis. Recent studies show that nearly all children are infected before the fourteenth year. A few die at once; a number heal out entirely; still a large number do not heal. The disease remains in a state of inactivity, latency, ready to heal, providing the proper conditions are brought about and ready to become active and spread to new parts in case conditions favoring this should arise. It is our duty as clinicians to recognize this latent period and see that conditions for cure are afforded the patient; and it is our further duty to watch for the first signs of such a latent focus becoming active and to waste no time when such symptoms occur in instituting the best methods of cure known to science. Delay and indecision at this time mean advanced tuberculosis and death; while decision and prompt action mean the saving of the patient.

The earliest form of tuberculosis, as we find it pathologically, is that which affects the lymphatic glands, the bacilli having passed through the tissues, usually the mucous membrane of the air passages or alimentary canal, without producing lesions, or producing small lesions as Ghon has recently shown to be the case in the lungs. This lymphatic form of tuberculosis, affecting chiefly the glands of the